

Title (en)  
HAND-HELD TEST METER WITH INTEGRATED THERMAL CHANNEL

Title (de)  
HANDHALTBARES PRÜFMESSGERÄT MIT INTEGRIERTEM WÄRMEKANAL

Title (fr)  
DISPOSITIF DE MESURE DE TEST PORTABLE À CANAL THERMIQUE INTÉGRÉ

Publication  
**EP 3191835 A1 20170719 (EN)**

Application  
**EP 15766428 A 20150908**

Priority  
• US 201414480939 A 20140909  
• EP 2015070518 W 20150908

Abstract (en)  
[origin: US2016069828A1] A hand-held test meter includes an electrically and thermally insulating case ("ETIC") with an outwardly facing surface, a test meter electrical component ("TMEC") with a thermal contact portion disposed within the electrically-insulating case, and at least one thermal channel. The thermal channel includes a proximal contact portion with a proximal contact surface, a distal contact portion with a distal surface, and a channel portion connecting the proximal contact portion and the distal contact portion. The thermal channel is integrated with the ETIC such that the thermal channel extends through the ETIC from the outwardly facing surface and to the thermal contact portion of the TMEC. The extension is such that the proximal contact surface of the thermal channel is outside of the ETIC and the distal surface of the thermal channel is in contact with the thermal contact portion of the TMEC. The thermal channel is thermally conductive and electrically-insulating.

IPC 8 full level  
**G01N 33/487** (2006.01); **G01K 7/42** (2006.01)

CPC (source: CN EP KR US)  
**G01D 11/24** (2013.01 - CN); **G01K 7/427** (2013.01 - EP KR US); **G01N 25/18** (2013.01 - KR US); **G01N 33/48785** (2013.01 - EP KR US); **G01N 33/49** (2013.01 - EP KR US); **G01N 33/66** (2013.01 - CN)

Citation (search report)  
See references of WO 2016038047A1

Designated contracting state (EPC)  
AL AT BE BG CH CY CZ DE DK EE ES FI FR GB GR HR HU IE IS IT LI LT LU LV MC MK MT NL NO PL PT RO RS SE SI SK SM TR

Designated extension state (EPC)  
BA ME

DOCDB simple family (publication)  
**US 2016069828 A1 20160310; US 9841391 B2 20171212**; AU 2015314299 A1 20170406; BR 112017004637 A2 20171205; CA 2960332 A1 20160317; CN 106687771 A 20170517; CN 106687771 A8 20170711; EP 3191835 A1 20170719; JP 2017527810 A 20170921; JP 6563005 B2 20190821; KR 20170051501 A 20170511; RU 2017111810 A 20181010; RU 2017111810 A3 20190319; RU 2705395 C2 20191107; TW 201621308 A 20160616; WO 2016038047 A1 20160317

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